



AIR ASSAULT PLANNING

CAPTAIN BARRETT F. LOWE

Helicopters—with their speed, agility, and firepower—are a unique and versatile addition to the combined arms team. They provide a means of bringing combat troops and firepower quickly to the battlefield where the infantry mission really begins. Infantry leaders at platoon and company level, therefore, must learn how to integrate aviation, along with all the other combined arms assets, into their tactical operations.

When battalion headquarters assigns a platoon or company an air assault mission, it is understood that the aircraft will be available. Because of the numerous contingency plans needed, however, there is still much to plan. In fact, leaders must plan an air assault mission in the same detail as a patrol. And in all phases of their planning, the company commander or platoon leader (hereafter referred to as the ground commander)

and the battalion S-3 Air must coordinate closely with the air mission commander (the pilot in command of the aviation element that is flying the mission).

Since the air movement plan for an operation must support the ground scheme of maneuver, it is imperative that the leaders follow a reverse planning sequence: First developing the ground tactical plan (the mission); then the landing plan (actions on the landing zone and in the assembly area); the air movement plan (flight enroute); the loading plan (actions on the pickup zone and crossloading); and the staging plan (movement to and organization on the pickup zone).

The ground commander visualizes every step of the operation from the time the unit begins moving to the insertion pickup zone (PZ) until his unit has safely returned to a friendly



area. (A partial list of helpful Army publications that pertain to air assault operations is shown in the accompanying box.)

As in any tactical mission, the commander's estimate starts with an analysis of the mission and an evaluation of the factors of METT-T (mission, enemy, terrain, troops, and time). Once the commander understands his mission, he examines all of the other factors in terms of their effect upon the successful accomplishment of the air assault operation.

The enemy's air defense capability and the types of weapons he has are of critical importance. Other factors to be considered, however, are whether the enemy can interdict friendly

air assault operations with his own fixed wing or rotary aircraft, how quickly he can react to an insertion, how mobile he is, what electronic warfare capability he has, how effective he has been in disrupting friendly communications, and whether his engineers have blocked possible LZs and PZs in the zone to limit air assault operations.

The commander analyzes the terrain in terms of OCOKA (observation and fields of fire, cover and concealment, obstacles and movement, key terrain, and avenues of approach). He examines the flight routes for ease of navigation (especially at night or during adverse weather), and for areas where the enemy may be able to observe the route.

He looks at the best places to use the terrain to mask the air movement, the best places for nap-of-the-earth flying, possible covered or concealed positions for attack helicopters, and LZs that offer cover and concealment for the infantrymen when they land.

Although the unit can bypass most obstacles during the air movement, the commander must consider obstacles that will affect the ground scheme of maneuver. Key terrain is normally dependent on the mission. Usually PZs and LZs should be considered key terrain, as well as occupied or planned forward area rearming and refueling point sites, and enemy air defense artillery positions.

The air avenues of approach tie the previous factors

REFERENCES

- FM 90-4, Air Assault Operations.
- FM 7-8, Infantry Platoon and Squad (Infantry, Airborne, Air Assault, Ranger).
- FM 7-10, Infantry Company (Infantry, Airborne, Air Assault, Ranger).
- FM 7-70, Light Infantry Platoon and Squad.
- FM 7-71, Light Infantry Company.
- FM 55-450-1, Army Helicopter External Load Operations.
- FM 55-450-2, Army Helicopter Internal Load Operations.
- FM 57-38, Pathfinder Operations.
- The Ranger Handbook.
- The Air Assault Handbook.

together. A good air avenue of approach offers good mobility for the helicopters with few obstacles to flight, little or no channelization, terrain masking to limit the effectiveness of the enemy's air defense artillery (ADA) weapons, and landmarks that are readily identifiable from the air.

Weather and visibility also affect air assault operations, perhaps more than terrain. Fog, low clouds, heavy rain, and the extensive use of smoke, for example, will limit visibility for the aviators, and the moon's illumination and angle will affect the pilots' ability to fly with night vision goggles (NVGs). High winds can limit the directions in which helicopters can land (or whether they can safely fly); snow and dust can cause whiteout or brownout problems; and even high temperatures can affect aircraft performance by reducing the loads they are able to carry.

The number of assault helicopters available will determine how much combat power can be placed on the ground in one lift. Planners must also consider the endurance of the aircrews (although in an emergency the commander of the aviation battalion involved can increase the amount of time the crews are allowed to fly).

Just as the lift helicopter is important in executing an air assault, though, so is the integration of the other combat and combat support elements. Often an air assault will go beyond the range of supporting artillery, for instance, and attack helicopters can provide the commander with fire support until the howitzers can be lifted forward. Attack helicopters can also cover insertions or extractions, seal off high-speed avenues of approach into the landing area, screen a high-risk flank, or provide armed route reconnaissance. (The fielding of the AH-64 Apache has significantly improved the ability of the aviation elements to support the ground maneuver in all weather.)

ARTILLERY ELEMENTS

A ground commander should also consider inserting artillery elements early so they can support the infantry insertion. A detailed plan to suppress the enemy's air defenses (SEAD) needs to be coordinated, especially if the enemy has sophisticated air defense weapons. Aerial forward observers can be used to control the supporting artillery elements until the ground force has been established. The availability of a tactical air control party can also provide for positive control of close air support, especially if the air assault is far beyond the FLOT (forward line of own troops). (Normally, this would be for a battalion rather than a platoon or company mission.)

Engineers clear LZs and PZs and provide sappers to support the ground tactical plan. Stinger crews help protect the landing areas and helicopter laager sites until extraction. Signal elements provide such long range communications as AM radio and tactical satellite links.

Time is extremely important in preparing for an air assault operation, because more planning and preparation time is usually required than for other types of operations. While the aviation unit is preparing its aircrews, servicing its aircraft,

and planning its flights, the infantry is also preparing for its mission. The two elements must then be brought together for rehearsals, especially if an unusual mission is being planned, such as a helocast, a rappel or fast-rope insertion, or a Stabo extraction. Additional time must also be factored in for night operations, especially if the mission calls for using multiple PZs and LZs or conducting slingload operations.

The key to maintaining surprise for an air assault is operational security (OPSEC). With the helicopters' vulnerability to ground fire and his reliance on radio communications, a commander cannot afford to let the enemy find out what he is doing before he lands. He can improve security by using secure equipment when radio listening silence is not feasible and by properly using brevity codes and radio procedures, false insertions, and false artillery preparations.

The commander must also plan for security on all LZs and PZs. Normally, the first element lifted in provides LZ security and the last element to be lifted out provides PZ security. If the situation permits, attack or scout helicopters can assist the ground force.

The commander must always assume that the enemy is watching the PZ or LZ and act accordingly. On insertions, he should treat an LZ as a danger area, move away from it quickly, and do his map check somewhere else. He should plan fires either on the LZ and the access routes into it or on the terrain that dominates it. This reduces the chances that the ground force will be surprised.

EXTRACTIONS

On extractions, as much of the force as possible should be kept in a security role for as long as possible, and the PZ should not be occupied too far in advance of extraction because this will make it more vulnerable to compromise. And once in position, the troops should stay off the PZ until the last moment (except, perhaps, for a signalman). The commander should plan fires on the PZ to be used when the unit is extracted to catch any enemy soldiers who may be trailing it.

As soon as the ground commander has determined how he wants to carry out the mission, he begins coordinating with the supporting aviation element. The aviators should be brought into the planning as soon as possible to give them enough time to prepare, and also to identify any significant aviation-related problems early so they can be solved. The air movement table and air mission briefing format found in Field Manual 90-4 are good guides to use.

The ground commander and the air movement commander must go over the ground scheme of maneuver, the locations of the PZs and LZs (including alternates), how they will be marked, the primary and alternate flight routes, downed aircraft procedures, all the codewords, the communications plan, the fire support plan (including SEAD), and a time check. The ground commander should give the air movement commander a copy of the air movement table and a copy of the overlay that shows the routes and all the PZs and LZs. And he should make sure the air commander clearly understands

the plan.

The air mission briefing also outlines other requirements for aviation support to the infantry—for example, a functioning patrol leader's handset, door gunners (infantry troops can assist), times and locations for rehearsals, and the agreed-upon configuration of the aircraft for the mission (that is, with or without seats, cabin tiedown for rappelling, and the like).

The ground and aviation commanders must also go over contingencies for a hot LZ, the bump plan, abort criteria, flying and landing formations, and back-up aircraft; the latter should be on standby in case there is a maintenance problem during the operation. The two commanders can use the air mission briefing format, which covers all the pertinent details, to improve the chances that all of the important information is disseminated between the infantry and aviation units. But the plan should be as simple as possible to keep from adding unnecessary complexity to an already complex mission.

The most important specific considerations in developing the landing plan are the availability, location, and size of the LZs, and also how easily identifiable the LZ is from the air. To avoid disorienting the troops, the pilots must seriously try to land on the heading that has been briefed (or at least to brief the senior man aboard before landing elsewhere).

The commander must decide, too, whether to use a single LZ or multiple LZs. (Platoon and company level operations usually use a single LZ.) LZs are usually five to ten kilometers away from the objective by day and as close as three to five kilometers at night, but these distances may vary depending on the mission. The landing formation should support quick assembly on the LZ, and the assembly plan must be simple enough to facilitate quick movement off the landing zone.

AIR MOVEMENT

The actual air movement can be conducted along either a route, a flight corridor, or a flight axis. (A route is the most restrictive control measure and a flight axis the least restrictive.) Aerial checkpoints should be relayed from the pilots to the senior man aboard so he can keep track of his location while in flight. This becomes critical when an aircraft goes down en route or lands in the wrong spot. The route should avoid enemy positions, avoid built-up areas (especially at night), and provide for ease of navigation. If multiple lifts are used, time for refueling must also be factored in.

The loading plan must cover PZ operations, and each aircraft must be crossloaded to spread out the unit's key assets. (To reduce the time it takes to load, each soldier should be assigned a specific seat on the helicopter so that he knows exactly where to go.) This is critical when multiple lifts are required so there will be no confusion as to who boards when. The soldiers who carry large loads (Dragon gunners, M60 machinegunners, RTOs, or mortarmen) should be assigned the outboard seats. If at all possible, the soldiers should board from both sides of the helicopter, and they should practice loading and unloading as often as possible.

PZs must be properly marked, including touchdown points and obstacles. During daylight operations, only a signalman is necessary. At night, infrared (IR) lights or regular chemlights, IR glint tape, and the like are the best means of marking a PZ (or an LZ). A strobe light should always be available for back-up in case the pilots have difficulty finding the PZ. If there is high grass on the zone, the chemlights should be raised on sticks. The land heading should not force the pilots to land into the sun, especially at dawn and dusk, because this will cause problems with their night vision goggles.

Sometimes it is possible—if it has been arranged for the helicopters to arrive early—to conduct rehearsals at the initial PZ before going on the mission. A bump plan must always be prepared that also includes straggler control. The wrong number of aircraft may come, or one of them may develop a maintenance problem, for example. The ground commander should always plan for the worst and expect a glitch to throw off an otherwise good plan.

The staging plan gets the troops to the PZ. For an infantry-pure lift, the troops should arrive at the PZ 15 to 30 minutes before liftoff. More time may be needed if the PZ needs to be marked or if sling-load operations are planned. This part of the operation usually goes smoothly if it has been properly prepared.

CONTINGENCIES

The ground commander must consider many different contingencies, such as the following:

- The LZ or PZ is hot.
- The aircraft land on the wrong LZ.
- The aircraft do not arrive on time.
- The wrong number of aircraft arrive.
- The aircraft show up with the wrong communications equipment (no secure radio, no handsets).
- The ground element cannot communicate with the aircraft that do arrive.
- An aircraft is downed en route or on the LZ.
- An aircraft lands on the wrong heading.
- Communication is lost during the mission.
- An aircraft crosses the gun-target line for SEAD or CAS.
- Bump and straggler plan.
- A soldier gets off the aircraft on a false insertion.
- MEDEVAC plan from the LZ or PZ.
- Back-up aircraft plan.
- Weather plan (especially if the weather turns bad between insertion and extraction).

While this is not a complete list of the things that can go wrong in planning for unexpected events, it is a good guide. Unit SOPs can often take care of some of these problems.

The following are some additional tips for air assault operations that may be useful:

- The senior infantryman flying on each helicopter should be trained to use the patrol leader's radio and to talk to the pilots. (It is easier for him to use the aircraft radio than to

have his radio-telephone operator hook into the coaxial connector for man-packed AN/PRC-77 radios.) He must keep abreast of what is going on, especially in navigation, and must have the pilot relay the aerial checkpoints to him. If he believes the pilots are putting him down in the wrong place, he should ask them for a doppler reading before he gets off. (The doppler device gives a reading of the grid coordinate for the helicopter's present location. If the device is properly set and calibrated before the mission, it shows the location quite accurately).

- A good rule is to have each soldier put an extra set of dogtags in his bootlaces to help in casualty identification in the event of a crash. Additionally, each platoon leader and platoon sergeant should carry a strobe light, and the squad leaders, too, if the unit has enough of them. All squad leaders and above should also carry signal mirrors and orange panel markers for signaling aircraft.

- During insertions in wooded areas, the troops should run all the way to the nearest woodline as soon as they get off the helicopter. There is no need to get down and linger in the open until the helicopters fly away. The less time spent there the better. Also, troops should not cross the LZ to get to their assembly area on the other side, but should move around to it along the edge of the woodline.

- LZs that are only large enough for one to three helicopters make it easier for the troops to get into the woods quickly and are easier to secure and defend. The same is true for extraction PZs.

- During extractions, security is vitally important, because by this time the enemy has some idea where the unit is and it is vulnerable to indirect fires. The troops, except for those in the marking party, should stay off the PZ until the helicopters actually touch down, and the soldiers should never be lined up in chalk order when being extracted from the field. Since each soldier knows which aircraft and which seat he has been assigned to, the squads should maintain cover and concealment until the squad leaders give the order to board.

- For a company level extraction, the commander must plan to have the security elements enter the air flow so that security can be maintained until the last lift. The platoon leader whose platoon is responsible for PZ security should be on the last helicopter of the last lift so that he can make sure nobody is left behind.

- An important consideration in marking LZs or PZs is the way the pilots see the different colors of chemlights with their night vision goggles. Orange, red, and infrared chemlights work the best for marking a landing area. Green or blue chem-

lights are more difficult to see because of the way green light is filtered in the goggles.

Safety is vitally important and must be stressed whenever infantry troops operate with helicopters. Different units may have slightly different SOPs, but soldiers should never be allowed to forget that they could be seriously injured or killed if they are careless. The soldiers should always wear their helmets with chinstraps fastened and wear their dogtags. Their shirtsleeves should be rolled down. Their weapons should point downward with the selector switches on safe, and no rounds should be chambered until the helicopter is on short final approach.

Radio antennas must be bent down to keep them clear of the rotor blades, and soldiers should stay clear of the tail rotor and stay crouched down until they are away from the helicopter. (The safety procedures when conducting slingload operations are more detailed, and units should consult FM 90-4, FM 55-450-1, and the Air Assault Handbook for more information.)

An air assault mission is complex, because it forces a commander to fully integrate his aviation, artillery, air defense, and other combat and combat support elements. A commander who fails to use any one of the supporting assets that he has available may quickly find himself in an untenable situation. This complexity requires detailed and centralized planning, although once the plan is complete, it is up to the platoons, squads, and aircrews to carry it out.

Commanders must rely on the judgment of their subordinates to accomplish the mission. There is simply too much happening at once for one man to be able to control everything. Every leader must anticipate unforeseen problems and be prepared to react to them. Because of the sheer number of things that can go wrong, not to mention the effect of the enemy's action, air assault leaders at all levels must be prepared to make quick, reasoned decisions in a fast-changing situation.

This is where an air assault leader develops the initiative and mental agility to fight successfully on the modern battlefield. An infantry officer in this environment really learns how to plan, puts into practice what he has learned, and comes to appreciate the value of the supporting arms.

Captain Barrett F. Lowe has served with the 1st Battalion, 509th Infantry (Airborne) and most recently, commanded an air assault rifle company in the 3d Battalion, 327th Infantry, 101st Airborne Division (Air Assault). He is now attending graduate school at the Air Force Institute of Technology en route to the U.S. Military Academy for instructor duty. He is a 1981 graduate of the Academy.

